

## **ABSTRACT**

Modified forms of hirudin having improved properties are disclosed. The modified hirudin compounds are hirudin variants comprising amino acid substitutions in the sequence of hirudin. Peptide molecules consisting of the amino acid residue sequence CILGSDGEKNQCVTGEGTPKPESHNDGDGE (SEQ ID NO: 1) or a sequence consisting of at least 9 consecutive amino acid residues of SEQ ID NO: 1 having a potential MHC class II binding activity are disclosed. The peptide has a stimulation index of  $> 1.8$  in a biological assay of cellular proliferation, in which the index is defined as the value of cellular proliferation scored following stimulation by the peptide and divided by the value of cellular proliferation scored in control cells that have not been exposed to the peptide.